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=> FIL REG
FILE 'REGISTRY' ENTERED AT 13:30:53 ON 09 SEP 2009
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=> D HIS

     FILE 'HCAPLUS' ENTERED AT 11:27:18 ON 09 SEP 2009
                E US2004-509944/APPS
L1             1 S E3
                SEL L1 RN

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L2            60 S E1-60

     FILE 'HCAPLUS' ENTERED AT 11:29:50 ON 09 SEP 2009
                E KONEMANN M/AU
L3             4 S E4
                E GESSNER T/AU
L4           280 S E3 OR E6-E9
                E SENS R/AU
L5           143 S E3 OR E5-E6
                E LENNARTZ C/AU
L6            42 S E3 OR E5
                E SEYBOLD G/AU
L7           107 S E3 OR E9-E10
L8           560 S L3-L7
                E BASF AKTIEN/CO
                E E8+ALL
L9          6380 S E1-E2/CO,CS,PA

     FILE 'REGISTRY' ENTERED AT 11:46:19 ON 09 SEP 2009
L10            3 S L2 AND ?DIMETHYL?/CNS
                E C30 H20 N8/MF
L11            1 S E3 AND L2

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L12              STR 615286-74-3

     FILE 'REGISTRY' ENTERED AT 13:22:13 ON 09 SEP 2009
L13            0 S L12

     FILE 'LREGISTRY' ENTERED AT 13:26:07 ON 09 SEP 2009
L15              STR L12

     FILE 'REGISTRY' ENTERED AT 13:26:33 ON 09 SEP 2009
L16            0 S L15
L17            8 S L15 FUL
                SAV L17 ANT944/A

     FILE 'HCAPLUS' ENTERED AT 13:27:58 ON 09 SEP 2009
L18            5 S L17
L19            2 S L18 AND (L8 OR L9)
L20            3 S L18 NOT L19


     FILE 'REGISTRY' ENTERED AT 13:30:53 ON 09 SEP 2009
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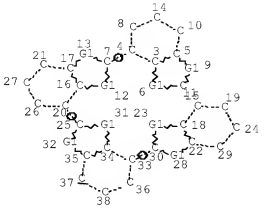

VAR G1=N/O/S
NODE ATTRIBUTES:
DEFAULT MLEVEL IS ATOM
DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:
RING(S) ARE ISOLATED OR EMBEDDED
NUMBER OF NODES IS 36

STEREO ATTRIBUTES: NONE
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100.0% PROCESSED 130608 ITERATIONS 8 ANSWERS
SEARCH TIME: 00.00.04

=> FIL HCAP
FILE 'HCAPLUS' ENTERED AT 13:31:11 ON 09 SEP 2009
USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.
PLEASE SEE "HELP USAGETERMS" FOR DETAILS.

=> D L19 1-2 IBIB ABS HITSTR HITIND RETABLE

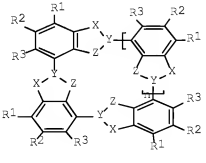
L19 ANSWER 1 OF 2 HCAPLUS COPYRIGHT 2009 ACS on STN
ACCESSION NUMBER: 2003:818426 HCAPLUS Full-text
DOCUMENT NUMBER: 139:323547
TITLE: Preparation of cyclic compounds and the use thereof as light absorbers, light emitters, or complex ligands
INVENTOR(S): Koenemann, Martin; Gessner, Thomas; Sens, Ruediger; Lennartz, Christian; Seybold, Guenther
PATENT ASSIGNEE(S): Basf Aktiengesellschaft, Germany

SOURCE: PCT Int. Appl., 75 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003084960	A1	20031016	WO 2003-EP3538	20030404
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NI, NO, NZ, OM, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
DE 10214937	A1	20031016	DE 2002-10214937	20020404
AU 2003232197	A1	20031020	AU 2003-232197	20030404
EP 1495025	A1	20050112	EP 2003-745787	20030404
EP 1495025	B1	20061220		
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, HU, SK				
JP 2005538042	T	20051215	JP 2003-582157	20030404
AT 348832	T	20070115	AT 2003-745787	20030404
US 20050167637	A1	20050804	US 2004-509944	20041004

PRIORITY APPLN. INFO.: DE 2002-10214937 A 20020404
WO 2003-EP3538 W 20030404

OTHER SOURCE(S): CASREACT 139:323547; MARPAT 139:323547
GI



I

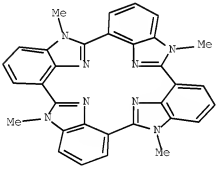
AB Disclosed is the use of cyclic compds. I [n = 1 - 7; X-Y-Z independently represent O-C:N, N:C-O, NR5-C:N, N:C-NR5, N+(R5)2-C:N, N:C-N+(R5)2, O-C:N+R5,

N+R5:C-O, S-C:N+R5, N+R5:C-S, S-C:N, N:C-S; R1, R2, R3 = H, C1-12-alkyl, C1-12-alkanoyl, C3-12-cycloalkyl, C6-12-aryl, , C7-13-aralkyl, C7-13-alkaryl, C1-12-alkoxy, C6-12-aryloxy, C1-12-hydroxyalkyl, heterocycle, C6-12-aroyl; R1R2, R2R3 = 1 - 3-membered carbocycle or heterocycle; R5 = H, (un)substituted C1-12-alkyl, C6-12-aryl, C7-13-alkylaryl, C1-12-alkanoyl, C7-13-aroyl, oligoethylene glycol or ether (with 1 - 6 oxygens), imidazolylmethyl, etc.; R7 = H, C1-12-alkyl, C6-12-aryl], tautomers, or metal complexes of the cyclic compds. or complexes of the cyclic compds. comprising mineral acids, X- (X = chloride, sulfate, hydrogen sulfate, phosphate, hydrogen phosphate, nitrate, BF4-, methanesulfonate) being supplied as counterions in cationic cycles, as light absorbers, materials for hole-injection layers in OLEDS, light-emitting compds. in OLED, phase transfer catalysts, synergists for dispersing pigments or for optical data storage. Also disclosed is a procedure for the preparation of I via cyclization of benzene derivs. II (R4 = CO2H; n = 1, 2; X = N; Z = N, O; whereby the OH group as the alkali metal or ammonium salt and/or the NH2 group either protonated or as NO, NO2, N:N-aryl, :NOH, :NH) is cyclized in the presence of a metal salt or powder. Thus, cyclo-2,4':2'7'':2'',4''':2''',7-quaterbenzimidazole (I; XYZ = NHC:N, R1 - R3 = H, n = 1) was prepared from ammonium 2,3-diaminobenzoate by heating to 100° in the presence of 85% polyphosphoric acid.

IT **612805-99-9P** **612806-02-7P** **612806-07-2P**
612838-52-5P **615286-74-3P** **615286-83-4P**
, Cycloquaterbenzoxazole
(preparation and use of, in OLED's; preparation of cyclic compds. for use as
light absorbers, light emitters, or complex ligands)

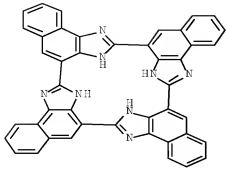
RN 612805-99-9 HCAPLUS

CN 4,6:10,12:16,18:22,24-Tetraiminotetrabenzo[b,f,j,n][1,5,9,13]tetraazacyclohexadecine, 25,26,27,28-tetramethyl- (9CI) (CA INDEX NAME)



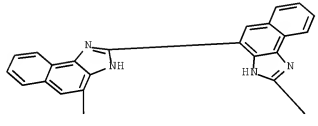
RN 612806-02-7 HCAPLUS

CN 5,7:13,15:21,23:29,31-Tetraiminotetranaphtho[2,3-b:2',3'-f:2'',3''-j:2''',3'''-n][1,5,9,13]tetraazacyclohexadecine (CA INDEX NAME)

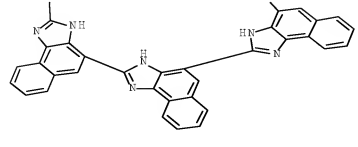


RN 612806-07-2 HCAPLUS
CN 5,7:13,15:21,23:29,31:37,39-Pentaiminopentanaphtho[2,3-b:2',3'-f:2'',3''-j:2''',3'''-n:2'''',3''''-r][1,5,9,13,17]pentaazacycloeicosine (9CI) (CA INDEX NAME)

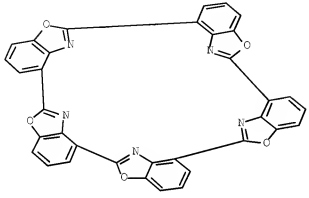
PAGE 1-A



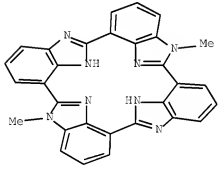
PAGE 2-A



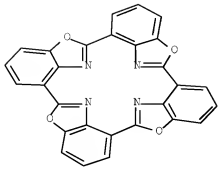
RN 612838-52-5 HCAPLUS
CN 4,6:10,12:16,18:22,24:28,30-
Pentaepoxypentabenzo[b,f,j,n,r][1,5,9,13,17]pentaazacycloeicosine
(9CI) (CA INDEX NAME)



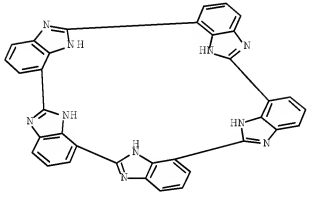
RN 615286-74-3 HCAPLUS
CN 4,6:10,12:16,18:22,24-
Tetraiminotetrabenzo[b,f,j,n][1,5,9,13]tetraazacyclohexadecine,
25,27-dimethyl- (9CI) (CA INDEX NAME)



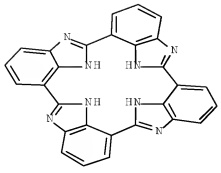
RN 615286-83-4 HCAPLUS
CN 4,6:10,12:16,18:22,24-
Tetraepoxytetrabenzo[b,f,j,n][1,5,9,13]tetraazacyclohexadecine (9CI)
(CA INDEX NAME)



IT 612805-98-8P
(preparation, metalation and use of, in OLED's; preparation of cyclic compds.
for use as light absorbers, light emitters, or complex ligands)
RN 612805-98-8 HCAPLUS
CN 4,6:10,12:16,18:22,24:28,30-
Pentaiminopentabenzo[b,f,j,n,r][1,5,9,13,17]pentaazacycloeicosine
(9CI) (CA INDEX NAME)



IT 25797-72-2P, Cyclo-2,4':2',7'':2'',4''':2''',7-
quaterbenzimidazole
(preparation, methylation or metalation and use of, in OLED's; preparation of
cyclic compds. for use as light absorbers, light emitters, or
complex ligands)
RN 25797-72-2 HCAPLUS
CN 4,6:10,12:16,18:22,24-
Tetraiminotetrabenzo[b,f,j,n][1,5,9,13]tetraazacyclohexadecine (CA
INDEX NAME)



IC ICM C07D0487-22
ICS C07D0498-22; C07D0513-22; H01L0051-30; B01J0031-02; C09B0067-00; A61K0007-40; C07D0257-00; C07D0235-00; C07D0259-00
CC 28-23 (Heterocyclic Compounds (More Than One Hetero Atom))
Section cross-reference(s): 29, 62, 67, 73, 78
IT 27199-20-8P 467231-63-6P **612805-99-9P** 612806-00-5P
612806-01-6P **612806-02-7P** 612806-04-9P
612806-07-2P **612838-52-5P** 613263-87-9P
613263-88-0P 613263-89-1P 613263-90-4P 613680-00-5P
613680-01-6P 613680-02-7DP, 1.3 degree of substitution
613680-03-8DP, 8.2 degree of substitution 613680-04-9P
613680-05-0P 613680-06-1P 613680-07-2DP, homologs 613680-08-3DP, homologs 613680-09-4P 613680-10-7P 613680-11-8P 613680-12-9P
615286-74-3P **615286-83-4P**, Cycloquaterbenzoxazole
(preparation and use of, in OLED's; preparation of cyclic compds. for use as
light absorbers, light emitters, or complex ligands)
IT **612805-98-8P**
(preparation, metalation and use of, in OLED's; preparation of cyclic compds.
for use as light absorbers, light emitters, or complex ligands)
IT 25797-72-2P, Cyclo-2,4':2',7'':2'',4''':2''',7-quaterbenzimidazole
(preparation, methylation or metalation and use of, in OLED's; preparation of
cyclic compds. for use as light absorbers, light emitters, or complex ligands)

RETABLE

Referenced Author (RAU)	Year (RPY)	VOL (RVL)	PG (RPG)	Referenced Work (RWK)	Referenced File
Nichols, L	1969			US 3481945 A	HCAPLUS
Obermayer, A	1993			US 5180821 A	HCAPLUS
Tauer, E	2002		723	SYNTHESIS	HCAPLUS

OS.CITING REF COUNT: 2 THERE ARE 2 CAPLUS RECORDS THAT CITE THIS RECORD (3 CITINGS)

L19 ANSWER 2 OF 2 HCAPLUS COPYRIGHT 2009 ACS on STN
ACCESSION NUMBER: 2003:656774 HCAPLUS Full-text
DOCUMENT NUMBER: 139:197511
TITLE: Preparation of cyclic compounds for use as complex ligands
INVENTOR(S): Tauer, Erich
PATENT ASSIGNEE(S): **BASF Aktiengesellschaft, Germany**

SOURCE: PCT Int. Appl., 22 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003068779	A1	20030821	WO 2003-EP1490	20030214
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
DE 10206366	A1	20030828	DE 2002-10206366	20020215
AU 2003205767	A1	20030904	AU 2003-205767	20030214
EP 1476447	A1	20041117	EP 2003-702641	20030214
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JP 2005525343	T	20050825	JP 2003-567906	20030214
US 20050159596	A1	20050721	US 2004-503587	20040812
PRIORITY APPLN. INFO.:			DE 2002-10206366 A	20020215
			WO 2003-EP1490 W	20030214

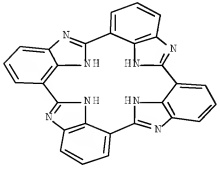
OTHER SOURCE(S): MARPAT 139:197511

AB Macrocycles I [X-Y-Z = N:CO, NHC:N, N:CNH; R1-R3 = H, alkyl] and their acyclic analogs II were prepared for use as complex ligands (no data). Thus, 2,3-HO(O2N)C6H3CO2Me was converted to 2,3-HO(O2N)C6H3CONH2, reduced to 2,3-HO(H2N)C6H3CONH2 and cyclized with polyphosphoric acid to give I [X-Y-Z = N:CO, R1-R3 = H]. II [R1-R3 = H] was similarly prepared

IT 25797-72-2P
(preparation of cyclic compds. for use as complex ligands)

RN 25797-72-2 HCAPLUS

CN 4,6:10,12:16,18:22,24-Tetraiminotetrabenzo[b,f,j,n][1,5,9,13]tetraazacyclohexadecine (CA INDEX NAME)



IC ICM C07D0498-22
ICS C07D0487-22; C07D0263-62; C07D0323-00; C07D0263-00; C07D0257-00; C07D0235-00
CC 28-23 (Heterocyclic Compounds (More Than One Hetero Atom))
IT 25797-72-2P 467231-63-6P 467231-66-9P,
7,7':2',2'':7'',7'''-Quaterbenzoxazole
(preparation of cyclic compds. for use as complex ligands)
RETABLE

Referenced Author (RAU)	Year (RPY)	VOL (RVL)	PG (RPG)	Referenced Work (RWK)	Referenced File
Gitina, R	1966	8	1535	VYSOKOMOLEKUL SOEDIN	HCAPLUS
Liechti, P	1971			US 3575996 A	
Nichols, L	1969			US 3481945 A	HCAPLUS
Obermayer, A	1993			US 5180821 A	HCAPLUS
Tauer, E	2002		723	SYNTHESIS	HCAPLUS

=> D L20 1-3 IBIB ABS HITSTR HITIND RETABLE

L20 ANSWER 1 OF 3 HCAPLUS COPYRIGHT 2009 ACS on STN
ACCESSION NUMBER: 2002:370210 HCAPLUS Full-text
DOCUMENT NUMBER: 137:279132
TITLE: Preparation of new cyclic quaterbenzoxazole and -imidazole derivatives
AUTHOR(S): Tauer, Erich
CORPORATE SOURCE: Max-Planck-Institut fur biophysikalische Chemie, Abteilung Spektroskopie und Photochemische Kinetik, Gottingen, 37070, Germany
SOURCE: Synthesis (2002), (6), 723-725
CODEN: SYNTBF; ISSN: 0039-7881
PUBLISHER: Georg Thieme Verlag
DOCUMENT TYPE: Journal
LANGUAGE: English
OTHER SOURCE(S): CASREACT 137:279132
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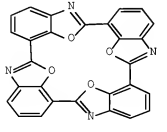
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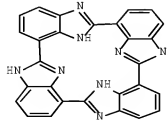

II

AB The new cyclic quaterbenzoxazole I and -imidazole II have been synthesized by cyclization of 3-amino-2-hydroxybenzamide and the ammonium salt of 2,3-diaminobenzoic acid with polyphosphoric acid. Both compds. represent a new

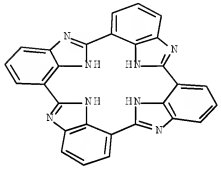
heterocyclic nine ring system, which can be built up from four identical (or different) benzo-x-azoles in a cyclic arrangement.

IT 25797-72-2P

(preparation of new cyclic quaterbenzoxazole and imidazole derivs. via cyclization of 3-amino-2-hydroxybenzamide and the ammonium salt of 2,3-diaminobenzoic acid)

RN 25797-72-2 HCAPLUS

CN 4,6:10,12:16,18:22,24-Tetraiminotetrabenzo[b,f,j,n][1,5,9,13]tetraazacyclohexadecine (CA INDEX NAME)



CC 28-9 (Heterocyclic Compounds (More Than One Hetero Atom))

IT 25797-72-2P 467231-63-6P 467231-66-9P, 7,7':2',2'':7'',7'''-Quaterbenzoxazole

(preparation of new cyclic quaterbenzoxazole and imidazole derivs. via cyclization of 3-amino-2-hydroxybenzamide and the ammonium salt of 2,3-diaminobenzoic acid)

RETABLE

Referenced Author (RAU)	Year (RPY)	VOL (RVL)	PG (RPG)	Referenced Work (RWK)	Referenced File
Denny, W	1990	33	814	J Med Chem	HCAPLUS
Diels, O	1902	35	302	Ber Dtsch Chem Ges	HCAPLUS
Grellmann, K	1974		375	Tetrahedron Lett	HCAPLUS
Meldrum, A	1928	5	95	J Indian Chem Soc	HCAPLUS
Wu, M	1971	8	989	J Heterocycl Chem	HCAPLUS

OS.CITING REF COUNT: 6 THERE ARE 6 CAPLUS RECORDS THAT CITE THIS RECORD (6 CITINGS)

L20 ANSWER 2 OF 3 HCAPLUS COPYRIGHT 2009 ACS on STN

ACCESSION NUMBER: 1993:449390 HCAPLUS Full-text

DOCUMENT NUMBER: 119:49390

ORIGINAL REFERENCE NO.: 119:8965a,8968a

TITLE: Cyclic tetrabenzimidazole

INVENTOR(S): Obermayer, Arthur S.; Hendrickson, James B.; Hussoin, Sajjat

PATENT ASSIGNEE(S): Moleculon Research Co., USA

SOURCE: U.S., 6 pp. Cont. of U.S. Ser. No. 725,88, abandoned.
CODEN: USXXAM

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 5180821	A	19930119	US 1992-847835	19920309
PRIORITY APPLN. INFO.:			US 1990-464998	B1 19900116
			US 1991-725883	B1 19910628

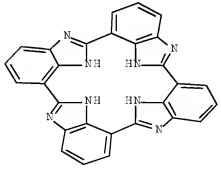
OTHER SOURCE(S): CASREACT 119:49390

AB The title compound I is yellowish, visually nonfluorescent, of mol. weight approx. 464, m.p. > 350°, with slight solubility in 1:1 EtOH:CHCl3, and possesses characteristic IR absorption bands (cm-1, in KBr) at 1620, 1550, 1450, 1400, and 1260. I is useful as a chelating agent (Cu complex prepared), a catalyst, and an electrooptic component (no data). I is prepared from 2,3-diaminobenzoic acid (II) via linear dimers which are coupled to linear tetramer, with a final cyclization step. Thus, 45 g II in 500 mL CHCl3 was treated with 150 mL SOCl2 in the presence of 15 mL Et3N to afford thiadiazole acid chloride III (R = Cl, 75% yield), which was hydrolyzed to the acid III (R = OH, 78% yield) with 10% KOH. III (R = OH, 18 g) and II Et ester (18 g) were coupled to form benzimidazole ester dimer IV (R = Et, 85%) by cyclodehydration in the presence of N-diphenylphosphinyl-N'-methylpiperazine (120 g in 500 mL CH2Cl2) and triflic anhydride (33.64 mL in 200 mL CH2Cl2). IV (R1 = H, 2.96 g) and diamino ester dimer V (2.96 g) [prepared by deprotection of IV (R = Et) with SnCl2/EtOH/HCl] were similarly coupled by cyclodehydration to afford 60% protected tetramer ester VI. In the final step, heating 264 mg tetramer diamino ester VII neat [prepared by deprotection of VI, as before] at 300° afforded 7% I.

IT 25797-72-2P
(preparation of, IR spectrum and solubility of, and absence of fluorescence of)

RN 25797-72-2 HCAPLUS

CN 4,6:10,12:16,18:22,24-Tetraiminotetrabenzo[b,f,j,n][1,5,9,13]tetraazacyclohexadecine (CA INDEX NAME)



IC ICM C07D0233-54

INCL 540465000

CC 28-9 (Heterocyclic Compounds (More Than One Hetero Atom))
Section cross-reference(s): 22, 26, 78

IT 25797-72-2P
(preparation of, IR spectrum and solubility of, and absence of fluorescence

of)
RETABLE

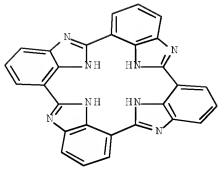
Referenced Author (RAU)	Year (RPY)	VOL (RVL)	PG (RPG)	Referenced Work (RWK)	Referenced File
Anon				US 3481945 A	HCAPLUS

OS.CITING REF COUNT: 4 THERE ARE 4 CAPLUS RECORDS THAT CITE THIS RECORD (4 CITINGS)

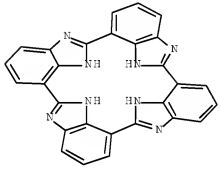
L20 ANSWER 3 OF 3 HCAPLUS COPYRIGHT 2009 ACS on STN
ACCESSION NUMBER: 1970:56703 HCAPLUS Full-text
DOCUMENT NUMBER: 72:56703
ORIGINAL REFERENCE NO.: 72:10405a
TITLE: Tetrabenzimidazole
INVENTOR(S): Nichols, Larry D.; Obermayer, Arthur S.
PATENT ASSIGNEE(S): Moleculon Corp.
SOURCE: U.S., 3 pp.
CODEN: USXXAM
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 3481945	A	19691202	US 1966-600560	19661209
PRIORITY APPLN. INFO.:			US 1966-600560 A	19661209

GI For diagram(s), see printed CA Issue.
AB Tetrabenzimidazole (I) and its Cu chelate (II) were prepared by condensing 2,3-(H2N)2C6H3CO2H (III) in the presence of CuCl2 and 3-Me-C6H4OH (IV). Thus, a mixture of III 0.5, aqueous CuCl2 0.14, and IV 1.42 g was refluxed for 4 hr at 200°, and treated with 10 ml MeOH to give 0.11 g dark platelets, m. >400°, which were washed with MeOH. The washings were evaporated and the residue slurried with Me2CO to yield 0.19 g product containing 50% I, m. 270°, and 50% II, m. >50°. II was soluble in and unaffected by H2SO4, and moderately soluble in MeOH, IV, dilute H2SO4, and Me2SO. Both acidic and neutral solns. fluoresced. II may be useful as dyes, semiconductors, and chelating agents.
IT 25797-72-2DP, 4,6:10,12:16,18:22,24-Tetraiminotetrabenzo[b,f,j,n][1,5,9,13]tetraazacyclohexadecine, copper complexes 25797-72-2P
(preparation of)
RN 25797-72-2 HCAPLUS
CN 4,6:10,12:16,18:22,24-Tetraiminotetrabenzo[b,f,j,n][1,5,9,13]tetraazacyclohexadecine (CA INDEX NAME)



RN 25797-72-2 HCAPLUS
CN 4,6:10,12:16,18:22,24-
Tetraiminotetrabenzo[b,f,j,n][1,5,9,13]tetraazacyclohexadecine (CA
INDEX NAME)



IC C07D0049-38A; C07F0001-08B; C08G0033-02B
INCL 260299000
CC 40 (Dyes, Fluorescent Whitening Agents, and Photosensitizers)
IT 25797-72-2DP, 4,6:10,12:16,18:22,24-
Tetraiminotetrabenzo[b,f,j,n][1,5,9,13]tetraazacyclohexadecine, copper
complexes 25797-72-2P 27199-20-8P
(preparation of)
OS.CITING REF COUNT: 5 THERE ARE 5 CAPLUS RECORDS THAT CITE THIS
RECORD (5 CITINGS)